

README and Guidance

Overview

The codes in this replication package construct all the tables and figures in the article: “Precolonial Elites and Colonial Redistribution of Political Power” by Allison Spencer Hartnett and Mohamed Saleh. The code runs in Stata, and requires six raw datasets. The first dataset spans the universe of Egyptian members of parliament (MPs) from 1824 to 1923, and is at the MP-session level. The second dataset includes information on all regressors that are used in the econometric analysis, and is at the province level. In addition, there are four other datasets that are required for running specific parts of the code, which are described below.

Data Sources

1. `RD1_Egypt_MPs_1824_1923.dta`. This dataset covers the universe of Egyptian MPs from 1824 to 1923. It was digitized from Subhi (1947). This dataset is at the MP-session level, with 1,102 observations.
2. `RD2_Regressors_Province.dta`. This dataset is at the province level. It includes data on all regressors that are used in the econometric analysis of the article. This dataset was constructed from the following sources:
 - Cotton productivity in quintars¹ per feddan in 1877 and cereals productivity in ardabbs² per feddan in 1877. These were digitized from the 1877 Statistical Yearbook (Ministère de l’Intérieur, 1877, Vol. 2, pp. 54–77). The original source contains information at the district level on crop area in feddans and crop output in Egyptian piasters. The crop output data were transformed into quantity as follows. For cotton, the transformation from piasters to quintars is based on the price of 327 Egyptian piasters per quintar in 1879 in Owen (1969, p. 126). For cereals (which include wheat, barley, and beans), the transformation from piasters to ardabbs is based on the price of 117 Egyptian piasters per ardabb for wheat, 52 piasters per ardabb for barley, and 92 piasters per ardabb for beans according to Owen (1969, p. 126) (for wheat and beans) and U.S. House of Representatives (1877, p. 905) (for barley). The data on crop area and quantity were then aggregated to the province level by calculating their sums across all districts in the province. Crop productivity per feddan is calculated by dividing total crop output quantity in the province by crop area in feddans in the province.

¹One quintar \equiv 44.5458 kilograms according to the 1873 Statistical Yearbook (Ministère de l’Intérieur, 1873, p. 2).

²One ardabb \equiv 133.6 kilograms according to the 1873 Statistical Yearbook (Ministère de l’Intérieur, 1873, p. 2).

- The population share of military and police in 1848 and the population share of bureaucrats in 1848 are both calculated from the 1848 Egyptian population census sample at the individual level that was digitized by Mohamed Saleh. This sample is described in Saleh (2013) and has been publicly disseminated on [IPUMS-International](#).
 - The Food and Agriculture Organization Global Agro-Ecological Zones (FAO-GAEZ) cotton and wheat suitability indices, as well as latitude and longitude, were downloaded from FAO-GAEZ Data Portal Version 3.0.1. Because Egyptian agriculture is irrigation-fed, we use the FAO-GAEZ crop suitability indices under irrigation and intermediate input level for the baseline period (1961–1990). We first calculated the FAO-GAEZ indices for cotton and wheat, and latitude and longitude, at the village level, using the shape files of sub-districts in the 2006 Egyptian population censuses. We then aggregated these variables to the province level by calculating the cross-village average within the province. Distance to Cairo was calculated from province-level latitude and longitude using the Stata package `geodist`.
 - The average number of pro-democratic parliamentary speeches per MP in 1866–1882 was estimated by the authors from the parliamentary minutes, *Dar al-Watha'iq al-Qawmiya* (2017). These minutes were digitized by the authors. The list of matters/issues of discussion that fall under the pro-democratic heading is in Appendix A6.
 - The number of Urabi arrests of village headmen was digitized from Foreign Office (1882).
 - The proportion of land in large estates is estimated from the share of *'ushuri* agricultural land from the 1877 Statistical Yearbook (Ministère de l'Intérieur, 1877, Vol. 1, pp. 123–9).
 - The proportion of rural Sudanese people in 1882, which we use as a measure of the proportion of emancipated rural slaves, is calculated from the 1882 population census report (Ministère de l'Intérieur, 1884).
3. `RD3_1882_1897.dta`. This dataset was manually constructed from the 1882 and 1897 census tabulations that were digitized by CEDEJ (2003). It provides the 1882 census district codes for the 1897 census districts. Constituencies of MPs in `RD1_Egypt_MPs_1824_1923.dta` were digitized at the data entry phase using the codes of the closest population census. For MPs whose districts are mapped using the 1897 census codes, this file maps these districts to the 1882 districts.
 4. `RD4_1882_1907.dta`. This dataset was manually constructed from the 1882 and 1897 census tabulations that were digitized by CEDEJ (2003). It provides the 1882 census district codes for the 1897 census districts. Constituencies of MPs in `RD1_Egypt_MPs_1824_1923.dta` were digitized

at the data entry phase using the codes of the closest population census. For MPs whose districts are mapped using the 1907 census codes, this file maps these districts to the 1882 districts.

5. `RD5_Map.dta` and `RD6_EGY_Subdistricts_coord.dta`. These two datasets provide the shape files of sub-districts according to the boundaries of the 2006 Egyptian population census. They were created and provided by Egypt's Central Agency for Public Mobilization and Statistics (CAPMAS).

Statement about Rights

- We certify that the author(s) of the manuscript have legitimate access to and permission to use the data used in this manuscript.

Public use data collected by the authors

- All the raw datasets used to support the findings of this study have been deposited in the APSR Dataverse repository.

Software Requirements

- Stata (code was last run with version 17.0). The following Stata packages must be installed prior to running the code:
 - `estout`
 - `spmap`
 - `reghdfe`
 - `esttout`
 - `coefplot`
 - `boottest`

Description of programs/code

Three do-files run all of the code to generate all the tables and figures in the article and the online appendix. They must be run in the following order:

1. `Data Preparation_APSR_Replication.do`. This do-file produces the working dataset `WD1_Egypt_MPs_1824_1923.dta` from the raw dataset `RD1_Egypt_MPs_1824_1923.dta`.
 - It starts from `RD1_Egypt_MPs_1824_1923.dta`.
 - It conducts data preparation on `RD1_Egypt_MPs_1824_1923.dta` using `RD3_1882_1897.dta` and `RD4_1882_1907.dta` to produce an intermediate dataset `ID1_Egypt_MPs_1824_1923.dta`.
 - It merges `ID1_Egypt_MPs_1824_1923.dta` with the province-level dataset on regressors `RD2_Regressors_Province.dta` to produce the working dataset `WD1_Egypt_MPs_1824_1923.dta`.

2. `Figures and Tables_APSR Replication.do`. This do-file produces all tables and figures in the main text using `WD1_Egypt_MPs_1824_1923.dta`. It also requires `RD5_Map.dta` and `RD6_EGY_Subdistricts_coord` to produce Figure 2.
3. `Appendix Figures and Tables_APSR Replication.do`. This do-file produces all tables and figures in the online appendix. It requires `WD1_Egypt_MPs_1824_1923.dta`.

Instructions to Replicators

- Download the six raw datasets referenced above from the data repository.
- Install the following packages in Stata: `spmap`, `reghdfe`, `estout`, `coefplot`, `boottest`.
- Edit `Data Preparation_APSR Replication.do` in Stata to change the working directory to the local directory where you saved the raw datasets.
- Run `Data Preparation_APSR Replication.do` in Stata. This will produce the working dataset `WD1_Egypt_MPs_1824_1923.dta`.
- Run `Figures and Tables_APSR Replication.do` in Stata. This will produce all the tables and figures in the main text.
- Run `Appendix Figures and Tables_APSR Replication.do` in Stata. This will produce all the tables and figures in the online appendix.

References

References

- CEDEJ (2003). *Century Census CD-ROM: Egypt 1882–1996*. Centre d’Etudes et de Documentation Economiques, Juridiques, et Sociales, Cairo.
- Dar al-Watha’iq al-Qawmiya (2001–2017). *The Minutes of Majlis Shura al-Nuwwab*. Dar al-Watha’iq al’Qawmiya, Cairo. 4 volumes.
- Foreign Office (1882). Communications from the British Consul in Egypt. ‘List of Persons Under Arrest in Connection with the Suppression of the Rebellion.’. FO 141 161, British National Archives, London.
- Ministère de l’Intérieur (1873). *Statistique de l’Égypte*. Imprimerie Française Mourès & Cie, Le Caire, Egypte.
- Ministère de l’Intérieur (1877). *Essai de Statistique Générale de l’Égypte: Années 1873, 1874, 1875, 1876, 1877 (Deux Volumes)*. Typographie de l’État-Major Générale Égyptien, Le Caire, Egypte.
- Ministère de l’Intérieur (1884). *Recensement Général de l’Égypte, 1882*. Imprimerie Nationale de Boulaq, Le Caire, Egypte.
- Owen, R. (1969). *Cotton and the Egyptian Economy, 1820-1914: A Study in Trade and Development*. Oxford University Press, Oxford.

- Saleh, M. (2013). A Pre-Colonial Population Brought to Light: Digitization of the Nineteenth-Century Egyptian Censuses. *Historical Methods: A Journal of Quantitative and Interdisciplinary History*, 46(1):5–18.
- Subhi, M. K. (1947). *History of Parliamentary Life in Egypt since the Era of Muhammad Ali Pasha, Vols. 5, 6, and Addendum*. Cairo: Dar al-Kutub.
- U.S. House of Representatives (1877). *Report upon the Commercial Relations of the United States with Foreign Countries for the Year 1876, 44th Congress, 2nd Session*. Government Printing Office, Washington, D.C.